05.90



RAW SEQUENCE LISTING ERROR REPORT

The Biotechnology Systems Branch of the Scientific and Technical Information Center (STIC) detected errors when processing the following computer readable form:

Application Serial Number:	10/016,516
Source:	OIPE
Date Processed by STIC:	4/11/2002

THE ATTACHED PRINTOUT EXPLAINS DETECTED ERRORS.
PLEASE FORWARD THIS INFORMATION TO THE APPLICANT BY EITHER:

- 1) INCLUDING A COPY OF THIS PRINTOUT IN YOUR NEXT COMMUNICATION TO THE APPLICANT, WITH A NOTICE TO COMPLY or,
- 2) TELEPHONING APPLICANT AND FAXING A COPY OF THIS PRINTOUT, WITH A NOTICE TO COMPLY

FOR CRF SUBMISSION QUESTIONS, PLEASE CONTACT MARK SPENCER, 703-308-4212.

FOR SEQUENCE RULES INTERPRETATION, PLEASE CONTACT ROBERT WAX, 703-308-4216. PATENTIN 2.1 e-mail help: patin21help@uspto.gov or phone 703-306-4119 (R. Wax) PATENTIN 3.0 e-mail help: patin3help@uspto.gov or phone 703-306-4119 (R. Wax)

TO REDUCE ERRORED SEQUENCE LISTINGS, PLEASE USE THE <u>CHECKER</u> <u>VERSION 3.1 PROGRAM</u>, ACCESSIBLE THROUGH THE U.S. PATENT AND TRADEMARK OFFICE WEBSITE. SEE BELOW FOR ADDRESS:

http://www.uspto.gov/web/offices/pac/checker

Applicants submitting genetic sequence information electronically on diskette or CD-Rom should be aware that there is a possibility that the disk/CD-Rom may have been affected by treatment given to all incoming mail. Please consider using alternate methods of submission for the disk/CD-Rom or replacement disk/CD-Rom. Any reply including a sequence listing in electronic form should NOT be sent to the 20231 zip code address for the United States Patent and Trademark Office, and instead should be sent via the following to the indicated addresses:

- 1. EFS-Bio (http://www.uspto.gov/ebc/efs/downloads/documents.htm, EFS Submission User Manual ePAVE)
- 2. U.S. Postal Service: U.S. Patent and Trademark Office, Box Sequence, P.O. Box 2327, Arlington, VA 22202
- Hand Carry directly to:
 U.S. Patent and Trademark Office, Technology Center 1600, Reception Area, 7th Floor, Examiner Name,
 Sequence Information, Crystal Mall One, 1911 South Clark Street, Arlington, VA 22202
 - U.S. Patent and Trademark Office, Box Sequence, Customer Window, Lobby, Room 1B03, Crystal Plaza Two, 2011 South Clark Place, Arlington, VA 22202
- 4. Federal Express, United Parcel Service, or other delivery service to: U.S. Patent and Trademark Office, Box Sequence, Room 1B03-Mailroom, Crystal Plaza Two, 2011 South Clark Place, Arlington, VA 22202

Revised 01/29/2002

Raw Sequence Listing Error Summary

ERROR DETECTED	SUGGESTED CORRECTION SERIAL NUMBER: 10/.0/6, 5/6	
ATTN: NEW RULES CASES	s: Please disregard english "alpha" headers, which were inserted by Pto S	OFTWARE
Wrapped Nucleics Wrapped Aminos	The number/text at the end of each line "wrapped" down to the next line. This may occur if your file was retrieved in a word processor after creating it. Please adjust your right margin to .3; this will prevent "wrapping."	
2Invalid Line Length	The rules require that a line not exceed 72 characters in length. This includes white spaces.	-
3 Misaligned Amino Numbering	The numbering under each 5th amino acid is misaligned. Do not use tab codes between numbers; use space characters, instead.	··· .
4Non-ASCII	The submitted file was not saved in ASCII(DOS) text, as required by the Sequence Rules. Please ensure your subsequent submission is saved in ASCII text.	-
5Variable Length	Sequence(s) contain n's or Xaa's representing more than one residue. Per Sequence Rules, each n or Xaa can only represent a single residue. Please present the maximum number of each residue having variable length and indicate in the <220>-<223> section that some may be missing.	
6PatentIn 2.0 "bug"	A "bug" in PatentIn version 2.0 has caused the <220>-<223> section to be missing from amino acid sequences(s) Normally, PatentIn would automatically generate this section from the previously coded nucleic acid sequence. Please manually copy the relevant <220>-<223> section to the subsequent amino acid sequence. This applies to the mandatory <220>-<223> sections for Artificial or Unknown sequences.	
7Skipped Sequences (OLD RULES)	Sequence(s) missing. If intentional, please insert the following lines for each skipped sequence: (2) INFORMATION FOR SEQ ID NO:X: (insert SEQ ID NO where "X" is shown) (i) SEQUENCE CHARACTERISTICS: (Do not insert any subheadings under this heading) (xi) SEQUENCE DESCRIPTION:SEQ ID NO:X: (insert SEQ ID NO where "X" is shown) This sequence is intentionally skipped	
	Please also adjust the "(ii) NUMBER OF SEQUENCES:" response to include the skipped sequences.	
8Skipped Sequences 2: (NEW RULES)	Sequence(s) missing. If Intentional, please insert the following lines for each skipped sequence. <210> sequence id number <400> sequence id number 000	
Use of n's or Xaa's (NEW RULES)	Use of n's and/or Xaa's have been detected in the Sequence Listing. Per 1.823 of Sequence Rules, use of <220>-<223> is MANDATORY if n's or Xaa's are present. In <220> to <223> section, please explain location of n or Xaa, and which residue n or Xaa represents.	
0Invalid <213> Response	Per 1.823 of Sequence Rules, the only valid <213> responses are: Unknown, Artificial Sequence, or scientific name (Genus/species). <220>-<223> section is required when <213> response is Unknown or is Artificial Sequence	
1Use of <220>	Sequence(s) missing the <220> "Feature" and associated numeric identifiers and responses. Use of <220> to <223> is MANDATORY if <213> "Organism" response is "Artificial Sequence" or "Unknown." Please explain source of genetic material in <220> to <223> section. (See "Federal Register," 06/01/1998, Vol. 63, No. 104, pp. 29631-32) (Sec. 1.823 of Sequence Rules)	•
2PatentIn 2.0 "bug"	Please do not use "Copy to Disk" function of Patentin version 2.0. This causes a corrupted file, resulting in missing mandatory numeric identifiers and responses (as indicated on raw sequence listing). Instead, please use "File Manager" or any other manual means to copy file to floppy disk.	•
3Misuse of n	n can only be used to represent a single nucleotide in a nucleic acid sequence. N is not used to represent any value not specifically a nucleotide.	

AMC/MH - Biotechnology Systems Branch - 08/21/2001



DATE: 04/11/2002

OIPE

```
TIME: 13:20:26
                      PATENT APPLICATION: US/10/016,516
                                                                         Does Not Comply
                                                                     Corrected Diskette Needed
                     Input Set : A:\EP.txt
                     Output Set: N:\CRF3\04112002\J016516.raw
      3 <110> APPLICANT: Houtzager, Erwin
              Vijn, Irma Maria Caecilia
              Sijmons, Peter Christiaan
      7 <120> TITLE OF INVENTION: A Structure for Presenting Desired Peptide Sequences
      9 <130> FILE REFERENCE: 2183-5208US
     11 <140> CURRENT APPLICATION NUMBER: US 10/016,516
     12 <141> CURRENT FILING DATE: 2001-12-10
     14 <160> NUMBER OF SEQ ID NOS: (17)/8 (/
16 <170> SOFTWARE: Patentin version 3.1/
E--> 14 <160> NUMBER OF SEQ ID NOS: (17)
ERRORED SEQUENCES
     18 <210> SEQ ID NO: 1
     19 <211> LENGTH: 291
     20 <212> TYPE: DNA
     21 <213> ORGANISM: Artificial Sequence
     23 <220> FEATURE:
     24 <223> OTHER INFORMATION: Description of Artificial Sequence: 5' end of exemplary
maximal
              primary scaffold.
     27 <220> FEATURE:
     28 <221> NAME/KEY: misc_feature
     29 <222> LOCATION: (79)..(93)
     30 <223> OTHER INFORMATION: The nucleotide at each of positions 79-93 may be any
nucleotide.
     32 <220> FEATURE:
     33 <221> NAME/KEY: misc_feature
     34 <222> LOCATION: (157)..(159)
     35 <223> OTHER INFORMATION: The nucleotide at each of positions 157-159 may be any
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     37 <220> FEATURE:
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     39 <222> LOCATION: (214)..(222)
     40 <223> OTHER INFORMATION: The nucleotide at each of positions 214-222 may be any
nucleotide.
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E--> 43 aat
              gtg
                    aaa
                           ctg
                                 gtt
                                                    ggt
                                                          ggc
                                                 54
     44Caac
              gat
                    gac
                           gat
                                 ctt
                                            Gly Gly Asn Phe
                                                                       Glu Asn
                  Lys Leu Val Glu Lys
                                                                  Val
                                                                                  Asp
                                                                                       Asp
     47 A,sn
             Val
W--> 48 Asp
     49
                                                                  1
                            15
```

nnn

nnn

nnn

nnn

nnn

RAW SEQUENCE LISTING

ctc

cgt

tgc

gct

gaa

ggt

E--> 52 aag

53~tac tgc atg ggt tgg 108 W--> 55~Lys Leu Thr Cys Arg Ala Glu Gly Xaa Xaa Xaa Xaa Xaa Tyr Cys Met W--> 56~Gly Trp

same en

DATE: 04/11/2002 RAW SEQUENCE LISTING PATENT APPLICATION: US/10/016,516 TIME: 13:20:26 Input Set : A:\EP.txt Output Set: N:\CRF3\04112002\J016516.raw 20 W--> 57 35 E--> 58 25 30 act gac agt aac gtg gcc gac E--> 60 ttc cgt cag gcg ccg aac atc tta nnn 162 W--> 61 acg ggg 63 Phe Arg Gln Ala Pro Asn Asp Asp Ser Thr Asn Val Ala Thr W--> 64 Xaa Gly 40 45 W--> 65 E--> 66 50 tcc gtc cgc ttc gat E--> 68 agc tac tac ggt gac aaa gag acg W--> 69 atc cgt cgc gac nnn 216 Ile Arg Arg 71 Ser Thr Tyr Tyr Gly Asp Ser Val Lys Glu Arg Phe Asp W--> 72 Asp Xaa 55 60 W - - > 73E--> 74 65 70 E--> 76 nnn acc gtt acc tta tcg atg gac gat ctg caa nnn aac 77 ccg gaa gac tct gca 270 W--> 79 Xaa Xaa Asn Thr Val Thr Leu Ser Met Asp Asp Leu Gln Pro Glu Asp W--> 80 Ser Ala 75 W--> 81 E--> 82 80 85 90 tct E--> 85 gaa aat tgt gca ggt tac 86 291 88 Glu Tyr Asn Cys Ala Gly W--> 89 95 91 <210> SEO ID NO: 2 92 <211> LENGTH: 42 93 <212> TYPE: DNA 94 <213> ORGANISM: Artificial Sequence 96 <220> FEATURE: 97 <223> OTHER INFORMATION: Description of Artificial Sequence: 3' end of exemplary maximal primary scaffold. 100 <400> SEQUENCE: 2 gtc tcg E--> 102 tac cac tac cgt ggt ggt acc gac gtt acc 103 tcq 42 Thr Asp Val Thr Val Ser 105 Tyr His Tyr Arg Gly Gln Gly 1 5 W--> 106 Misabejredaniso acid humbers 6LOBAL eva (see Hem 3 on Eur, 110 <210> SEQ ID NO: 3 111 <211> LENGTH: 405 112 <212> TYPE: DNA 113 <213> ORGANISM: Artificial Sequence 115 <220> FEATURE: 116 <223> OTHER INFORMATION: Description of Artificial Sequence: Scaffold with VHH 1MEI CDR 117 regions. 119 <400> SEQUENCE: 3

aaa

54

ggt

Val Lys Leu Val Glu Lys Gly Gly Asn Phe Val Glu Asn Asp Asp

ggc

aat

1

ttc

gtc gaa

4/11/02

gtg

gat

Leu

aaa

gac

ctg

gat

gtt

ctt

gaa

same enn

E--> 120 aat

W--> 125

121 aac

123 Asn W--> 124 Asp

DATE: 04/11/2002 PATENT APPLICATION: US/10/016,516 TIME: 13:20:26

Input Set : A:\EP.txt

Output Set: N:\CRF3\04112002\J016516.raw

E--> 126 10 15 E--> 128 aag ctc tgc cgt gct gaa ggt tac acc att ggc acg 129 tac tgc atg ggt tgg 108 Leu Thr Cys Arg Ala Glu Gly Tyr Thr Ile Gly Pro Tyr Cys Met 131 Lys W--> 132 Gly 20 W--> 133 E--> 134 25 30 35 act agt gtg gcc E--> 136 ttc cgt cag gcg ccg aac gac gac aac 162 137 acg atc aac atg ggt Asp Asp Ser Thr Asn Val Ala Ile Asn Arg Gln Ala Pro Asn ${ t Thr}$ 139 Phe W--> 140 Met Gly 45 40 W--> 141E--> 142 50 E--> 144 ggc ggt att acg tac tac ggt gac tcc qtc aaa gag 145 ttc gat atc cgt cgc 216 Gly Ile Thr Tyr Tyr Gly Asp Ser Val Lys Glu Arg Phe 147 Gly W--> 148 Arg Arg 55 60 W--> 149 70 E--> 150 65 E--> 152 gac gtt tcc aac acc acc tta tcg atg gac gat aac gcg 270 153 ctg caa ccg gaa gac 155 Asp Asn Ala Ser Asn Thr Val Thr Leu Ser Met Asp Asp Leu Gln Pro W--> 156 Glu Asp 75 W--> 157 E--> 158 80 85 90 E--> 160 tct tac gca ggt gat tct acc att gca gaa aat tgt -324 tat tat gaa 161 gcg agc Ala Gly Asp Ser Thr Ile Ala Glu Tyr Asn Cys Tyr Ala Ser Tyr 163 Ser W--> 164 Tvr Glu W--> 165 95 E--> 166 100 105 E--> 168 tgt ggt cat ggc ctg agt acc ggc ggt tac ggc tac gat tac cgt ggt 378 169 agc cac Gly His Gly Leu Ser Thr Gly Gly Tyr Gly Tyr Asp Ser His Tyr 171 Cys W--> 172 Arg Gly W--> 173 110 E--> 174 115 120 125 tcg E--> 177 cag ggt acc gac gtt acc gtc tcg 178 405 180 Gln Gly Thr Asp Val Thr Val Ser Ser 130 135 W--> 181 183 <210> SEQ ID NO: 4 184 <211> LENGTH: 422 185 <212> TYPE: DNA 186 <213> ORGANISM: Artificial Sequence 188 <220> FEATURE: 189 <223> OTHER INFORMATION: Description of Artificial Sequence: Scaffold with VHH 1BZQ CDR 190 regions.

192 <400> SEQUENCE: 4

DATE: 04/11/2002

PATENT APPLICATION: US/10/016,516

TIME: 13:20:26

Input Set : A:\EP.txt

Output Set: N:\CRF3\04112002\J016516.raw

same

E>		aat aac	gtg gat	aaa gac	_	gtt	gaa	aaa 54		t	ggc	aat	ttc	gtc	ga	a		
	196	Asn	Val		Leu Val		Lys			Asn	Phe	Val	Glu	Asn	Asp	Asp		
W>		Asp	Leu									1				5		
E>		10	•		15							-				•		
E>			ctc	acg		cgt	gct	agc	gg	t	tac	gcc	tac	acg	ta	t		
		atc	tac	_				108					٠.					
		Lys		Thr (Cys Arg	Ala	Ser	Gly	Tyr	Ala	Tyr	Thr	Tyr	Ile	Tyr	Met		
M>		Gly	Trp							20								
E>		25			30			35	20									
E>			cgt	сач	gcg	cca	·aac		αa	c ·	ant	act	aac	gtg	qc	C		
		acc	atc	-	tcg			162	gu		age	ucc	auc	9-9	90	_		
		Phe		_	Ala Pro				Ser	Thr	Asn	Val	Ala	Thr	Ile	Asp		
W>	213	Ser	Gly					_								_		
M>	214		•		•			•				40				45		
E>																		
E>			ggc			ctg	tac	ggt	ga	C	tcc	gtc	aaa	gag	cg	С		
		ttc	gat	atc	_	cgc	C1	216	Con	17-1	T	C1.,	7 ~~	Dho	Aan	Tlo '		
W>		Gly	Arq	GIA 1	Thr Leu	TAT	GTÅ	ASP	ser	Val	гуу	GIU	AIG	Pne	ASP	Ile		
W>		ALG	ALG									55				60		
E>		65				70						33						
E>			aaa	ggc	tcc	aac	acc	gtt	ac	C	tta	tcg	atg	gac	ga	t		
	226	ctg	caa	ccg	gaa	gac		270										
		Asp	Lys	Gly S	Ser Asn	Thr	Val	Thr	Leu	Ser	Met	Asp	Asp	Leu	Gln	Pro		
W>		Glu	Asp															
W>																75		
E>			a aa	42.2	85 tac	aat	+	90 gca	~~	~	aat	aaa	tac	σa:		ta		
E/		cgc	gca gac	gaa cqc		tac	_	324	gc	y	ggt	ggc	Lac	gaa	1 0	tg ·		
		Ser	_	_	yr Asn				Glv	Glv	Tvr	Glu	Leu	Arq	Asp	Arg		
W>			Tyr		2	- 1 -			2	1	- 4 -					,		
M>	238														95			
E>	239	100			105													
E>			cag	cgt	ggt	cag	ggt	acc	ga	C (gtt	acc	gtc	tcg	tc	g ·		
E>			a 1	·s	11 21	a 3	m¹		17- 3	m³	,, ,		a -					
T.T \		GIY	GIn.	Arg G	Sly Gln	GLY	Thr	Asp	Val			Ser	Ser	115				
W>		120								•	110			115				
F>			> SEO	ID NO:	5													
				GTH: 35														
				E: DNA	•													
					Artific	ial Se	quenc	ce										
			> FEAT		*						_							
a==	254	<223	> OTHE	ER INFO	RMATION	: Desc	ripti	ion of	Arti	fici	al Se	quence	: Sca	ffold	with	VHH 1HC	ZV	
CDR	255		~~~	ione														
	255 257	<100°		ions. JENCE:	5													
	431	~ 4 00.	الأطف ح	DENCE:	<i>J</i>													

DATE: 04/11/2002

PATENT APPLICATION: US/10/016,516

TIME: 13:20:26

Input Set : A:\EP.txt

Output Set: N:\CRF3\04112002\J016516.raw

ttc E--> 258 aat ctg gtt gaa aaa ggt ggc aat gtc gaa gtg aaa gat 54 259 aac ctt gat gac Val Lys Leu Val Glu Lys Gly Gly Asn Phe Val Glu Asn Asp Asp 261 Asn W--> 262 Asp 5 W--> 263 1 E--> 264 10 15 E--> 266 aag ctc acq tgc cqt gct gaa ggt cgt acg ggt tcg acc 108 267 tac gat atg ggt tqq Leu Thr Cys Arg Ala Glu Gly Arg Thr Gly Ser Thr Tyr Asp Met 269 Lys W--> 270 GlyW--> 27120 30 E--> 272 25 35 E--> 274 ttc cgt cag gcg ccg aac gac gac agt act aac gtg gcc 275 acq atc aac tgg gat 162 277 Phe Arg Gln Ala Pro Asn Asp Asp Ser Thr Asn Val Ala Thr W--> 278 Trp Asp 45 W--> 279 40 E--> 280 50 E--> 282 agc tac ggt gac tcc gtc gag cgc cgt acg tac aaa gcc 216 283 ttc gat atc cgt cgc Ala Arg Thr Tyr Tyr Gly Asp Ser Val Lys Glu Arg Phe Asp 285 Ser W--> 286 Arg Arg W--> 287 55 70 E--> 288 60 65 gcc tta atg E--> 290 gac tcc aac acc qtt acc tcq gac aat 270 291 ctg caa ccg gaa gac Asn Ala Ser Asn Thr \mathtt{Thr} Leu Gln Pro Val Leu Ser Met Asp Asp 293 Asp W--> 294 Glu Asp W--> 295 75 E--> 296 80 90 85 E--> 298 tct gca gaa tac aat tgt gca ggt ggt gaa ggc ggc acc 299 tgg gat agc cgt ggt 324 Ala Glu Tyr Asn Cys Ala Gly Gly Glu Gly Gly Thr Trp 302 Ser W--> 303 Arg Gly W--> 304 95 E--> 305 100 105 E--> 308 cag ggt gac gtt gtc tcg tcg acc acc 309 351 311 Gln Gly Thr Asp Val Thr Val Ser Ser W--> 312 115 110 340 <210> SEQ ID NO: 8 341 <211> LENGTH: 144 342 <212> TYPE: PRT 343 <213> ORGANISM: IF2X - Single Domain Camelid Antibody Cab-Ca05 345 <220> FEATURE: 346 <221> NAME/KEY: misc_feature 347 <222> LOCATION: (7) 348 <223> OTHER INFORMATION: The 'Xaa' indicator at position 7 indicates the absence of an amino

acid residue.

349



DATE: 04/11/2002

TIME: 13:20:26 PATENT APPLICATION: US/10/016,516 Input Set : A:\EP.txt Output Set: N:\CRF3\04112002\J016516.raw 351 <220> FEATURE: 352 <221> NAME/KEY: misc_feature 353 <222> LOCATION: (10)..(11) 354 <223> OTHER INFORMATION: The 'Xaa' indicators at positions 10-11 indicate the absence of 355 amino acid residues. 357 <220> FEATURE: 358 <221> NAME/KEY: misc_feature 359 <222> LOCATION: (13) 360 <223> OTHER INFORMATION: The 'Xaa' indicator at position 13 indicates the absence of an amino 361 acid residue. 363 <220> FEATURE: 364 <221> NAME/KEY: misc_feature 365 <222> LOCATION: (33)..(37) 366 <223> OTHER INFORMATION: The 'Xaa' indicators at positions 33-37 indicate the absence of 367 amino acid residues. 369 <220> FEATURE: 370 <221> NAME/KEY: misc_feature 371 <222> LOCATION: (49) 372 <223> OTHER INFORMATION: The 'Xaa' indicator at position 49 indicates the absence of an amino 373 acid residue. 375 <220> FEATURE: 376 <221> NAME/KEY: misc_feature 377 <222> LOCATION: (54)..(55) 378 <223> OTHER INFORMATION: The 'Xaa' indicators at positions 54-55 indicate the absence of 379 amino acid residues. 381 <220> FEATURE: 382 <221> NAME/KEY: misc_feature 383 <222> LOCATION: (65)..(66) 384 <223> OTHER INFORMATION: The 'Xaa' indicators at positions 65-66 indicate the absence of 385 amino acid residues. 387 <220> FEATURE: 388 <221> NAME/KEY: misc_feature 389 <222> LOCATION: (68)..(69) 390 <223> OTHER INFORMATION: The 'Xaa' indicators at positions 68-69 indicate the absence of 391 amino acid residues. 393 <220> FEATURE: 394 <221> NAME/KEY: misc_feature 395 <222> LOCATION: (101) 396 <223> OTHER INFORMATION: The 'Xaa' indicator at position 101 indicates the absence of an 397 amino acid residue. 399 <220> FEATURE: 400 <221> NAME/KEY: misc_feature 401 <222> LOCATION: (103)

402 <223> OTHER INFORMATION: The 'Xaa' indicator at position 103 indicates the absence of

RAW SEQUENCE LISTING

an

403 amino acid residue.

405 <220> FEATURE:

406 <221> NAME/KEY: misc_feature

407 <222> LOCATION: (140)

408 <223> OTHER INFORMATION: The 'Xaa' indicator at position 140 indicates the absence of

an

DATE: 04/11/2002 TIME: 13:20:26

PATENT APPLICATION: US/10/016,516

Input Set : A:\EP.txt

Output Set: N:\CRF3\04112002\J016516.raw

evers as described amino acid residue. 411 <400> SEQUENCE: 8 W--> 412 Gln Val Gln Leu Val Glu Xaa Ser Gly Xaa Kaa Gly Xaa Gly Ser Val E--> 413 Gln Ala E--> 414 1 E--> 415 5 10 15 Ser Leu Arg Leu Ser Cys Ala Ala Ser Gly Tyr Thr Xaa Xaa W--> 417 Gly Gly E--> 418 Xaa Xaa E--> 420 20 25 30 35 Ser Thr Tyr Cys Met Gly Trp Phe Arg Gln Xaa Ala Pro Gly W--> 422 Xaa Val E--> 423 Lys Xaa E--> 424 E--> 425 45 50 W--> 427 Xaa Glu Arg Glu Gly Val Ala Thr Ile Leu Xaa Xaa Gly Xaa Xaa Gly E--> 428 Ser 55 E--> 429 E--> 430 60 65 70 432 Tyr Tyr Asp Ser Val Lys Gly Arg Phe Thr Ile Ser Gln Asp Asn E--> 433 Ala Lys E--> 435 75 80 85 90 W--> 437 Asn Thr Val Tyr Leu Gln Met Asn Ser Leu Xaa Lys Xaa Pro Glu E--> 438 Thr Ala E--> 439 95 E--> 440 100 105 442 Ile Tyr Tyr Cys Ala Gly Ser Thr Val Ala Ser Thr Gly Trp Cys E--> 443 Arg Leu E--> 444 110 E--> 445 115 125 120 W-->447 Arg Tyr Asp Tyr His Tyr Arg Gly Gln Gly Thr Gln Xaa Val Thr \mathtt{Pro} Ser E--> 448 Val E-->449130 E--> 450 135 140 452 <210> SEQ ID NO: 9 453 <211> LENGTH: 144 454 <212> TYPE: PRT 455 <213> ORGANISM: 1QD0 - Camelid Heavy Chain Variable Domain 457 <220> FEATURE: 458 <221> NAME/KEY: misc_feature 459 <222> LOCATION: (7) 460 <223> OTHER INFORMATION: The 'Xaa' indicator at position 7 indicates the absence of an amino 461 acid residue. 463 <220> FEATURE: 464 <221> NAME/KEY: misc_feature 465 <222> LOCATION: (10)..(11) 466 <223> OTHER INFORMATION: The 'Xaa' indicators at positions 10-11 indicate the absence of 467 amino acid residues.

469 <220> FEATURE:

471 <222> LOCATION: (13)

470 <221> NAME/KEY: misc_feature



RAW SEQUENCE LISTING DATE: 04/11/2002 PATENT APPLICATION: US/10/016,516 TIME: 13:20:26

Input Set : A:\EP.txt

Output Set: N:\CRF3\04112002\J016516.raw

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Same error

Ser Leu Arg Leu Ser Cys Ala Ala Ser Gly Arg Ala Xaa Xaa

Ser

15

E--> 527 10

E--> 530 Ala

W--> 529 Gly Gly

RAW SEQUENCE LISTING DATE: 04/11/2002 PATENT APPLICATION: US/10/016,516 TIME: 13:20:26 Input Set : A:\EP.txt Output Set: N:\CRF3\04112002\J016516.raw E--> 531 E--> 532 25 30 W--> 534 Gly Gly His Tyr Gly Met Gly Trp Phe Arg Gln Xaa Val Pro Gly His E--> 535 Lys Xaa E--> 537 40 45 50 W--> 539 Xaa Phe Val Ala Ala Ile Arg Trp Ser Gly Xaa Lys Glu Glu Arq E--> 540 Glu Thr E--> 541 55 E--> 542 60 70 65 544 Trp Val Lys Gly Arg Phe Thr Ile Ser Arg Asp Ser Asn Tyr Lys Asp E--> 545 Ala Lys E--> 547 75 80 85 90 W--> 549 Thr Lys Thr Gln Met Ser Leu Xaa Xaa Gly Val Tyr Leu Asn E--> 550 Thr Ala 95 E--> 551 E--> 552 100 105 W--> 554 Val Cys Ala Ala Arg Pro Val Arg Val Ala Asp Ile Ser Xaa Tyr Tyr E--> 555 Xaa E--> 557 110 115 120 125 Tyr Trp Gly Gln Gly Thr Gln Xaa Val W--> 559 Leu Val Gly Phe Asp Pro E--> 560 Val Ser E--> 561 130 E--> 562 135 140 564 <210> SEQ ID NO: 10 565 <211> LENGTH: 144 566 <212> TYPE: PRT 567 <213> ORGANISM: 8FAB - Heavy Chain from Human Igg1 569 <220> FEATURE: 570 <221> NAME/KEY: misc_feature 571 <222> LOCATION: (7) 572 <223> OTHER INFORMATION: The 'Xaa' indicator at position 7 indicates the absence of an amino 573 acid residue. 575 <220> FEATURE: 576 <221> NAME/KEY: misc_feature 577 <222> LOCATION: (10)..(11) 578 <223> OTHER INFORMATION: The 'Xaa' indicators at positions 10-11 indicate the absence of 579 amino acid residues. 581 <220> FEATURE: 582 <221> NAME/KEY: misc_feature 583 <222> LOCATION: (13) 584 <223> OTHER INFORMATION: The 'Xaa' indicator at position 13 indicates the absence of an amino 585 acid residue. 587 <220> FEATURE: 588 <221> NAME/KEY: misc_feature 589 <222> LOCATION: (33)..(37)

590 <223> OTHER INFORMATION: The 'Xaa' indicators at positions 33-37 indicate the absence

593 <220> FEATURE:

amino acid residues.

594 <221> NAME/KEY: misc_feature

of

591



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```
595 <222> LOCATION: (49)
     596 <223> OTHER INFORMATION: The 'Xaa' indicator at position 49 indicates the absence of
an amino
     597
              acid residue.
     599 <220> FEATURE:
     600 <221> NAME/KEY: misc_feature
     601 <222> LOCATION: (54)..(55)
     602 <223> OTHER INFORMATION: The 'Xaa' indicators at positions 54–55 indicate the absence
of
     603
              amino acid residues.
     605 <220> FEATURE:
     606 <221> NAME/KEY: misc_feature
     607 <222> LOCATION: (65)..(66)
     608 <223> OTHER INFORMATION: The 'Xaa' indicators at positions 65-66 indicate the absence
of
     609
              amino acid residues.
     611 <220> FEATURE:
     612 <221> NAME/KEY: misc_feature
     613 <222> LOCATION: (101)
     614 <223> OTHER INFORMATION: The 'Xaa' indicator at position 101 indicates the absence of
an
     615
              amino acid residue.
     617 <220> FEATURE:
     618 <221> NAME/KEY: misc_feature
     619 <222> LOCATION: (103)
     620 <223> OTHER INFORMATION: The 'Xaa' indicator at position 103 indicates the absence of
an
     621
              amino acid residue.
     623 <220> FEATURE:
     624 <221> NAME/KEY: misc_feature
     625 <222> LOCATION: (121)..(127)
     626 <223> OTHER INFORMATION: The 'Xaa' indicators at positions 121-127 indicate the
absence of
     627
              amino acid residues.
     629 <220> FEATURE:
     630 <221> NAME/KEY: misc_feature
     631 <222> LOCATION: (140)
     632 <223> OTHER INFORMATION: The 'Xaa' indicator at position 140 indicates the absence of
an
                                           sam
              amino acid residue.
     635 <400> SEQUENCE: 10
W--> 636 Ala Val Lys Leu Val Gln Xaa Ala Gly Xaa Xaa Gly Xaa Gly Val Val
E--> 637 Gln Pro
                                                          1
                                                                             5
E--> 638
E--> 639 10
                            15
                            Arg Leu Ser Cys Ile Ala Ser Gly Phe Thr Xaa Xaa
W--> 641 Gly Arg
                  Ser
                      Leu
E--> 642 Xaa
             Xaa
                                                                        20
E--> 643
E--> 644 25
                        30
                                           35
                  Ser Asn Tyr Gly Met His Trp Val Arg Gln Xaa Ala Pro Gly
W--> 646 Xaa
             Phe
E--> 647 Lys
             Xaa
                                                                    40
E--> 648
```

50

E--> 649 45



W--> 651 Xaa Gly Leu Glu Trp Val Ala Val Ile Trp Xaa Xaa Tyr Asn Gly Ser E--> 652 Arg Thr E--> 653 55 60

Jan

DATE: 04/11/2002

TIME: 13:20:26 PATENT APPLICATION: US/10/016,516. Input Set : A:\EP.txt Output Set: N:\CRF3\04112002\J016516.raw E--> 654 65 Tyr Gly Asp Ser Val Lys Gly Arg Phe Thr Ile Ser Arg 656 Tyr E--> 657 Ser 90 85 E--> 659 75 80 Thr Met Gln Met Asn Ser Leu Xaa Arg Xaa Glu W--> 661 Arg Thr Leu Tyr E--> 662 Thr Alal 95 E--> 663 E--> 664 100 105 Tyr Tyr Cys Ala Arg Asp Pro Ile Leu Thr Xaa Xaa Xaa Asp W--> 666 Val E--> 667 Xaa 110 E--> 668 125 E--> 669 115 120 Trp Gly Gln Gly Val Leu W--> 671 Xaa Ala Phe Ser Phe Asp Tyr E--> 672 Val Ser 130 E--> 673 E--> 674 135 140 676 <210> SEQ ID NO: 11 677 <211> LENGTH: 144 678 <212> TYPE: PRT 679 <213> ORGANISM: 1VSC - Human Vcam-1 681 <220> FEATURE: 682 <221> NAME/KEY: misc_feature 683 <222> LOCATION: (1) 684 <223> OTHER INFORMATION: The 'Xaa' indicator at position 1 indicates the absence of an amino 685 acid residue. 687 <220> FEATURE: 688 <221> NAME/KEY: misc_feature 689 <222> LOCATION: (7) 690 <223> OTHER INFORMATION: The 'Xaa' indicator at position 7 indicates the absence of an amino acid residue. 691 693 <220> FEATURE: 694 <221> NAME/KEY: misc_feature 695 <222> LOCATION: (13) 696 <223> OTHER INFORMATION: The 'Xaa' indicator at position 13 indicates the absence of an amino 697 acid residue. 699 <220> FEATURE: 700 <221> NAME/KEY: misc_feature 701 <222> LOCATION: (33)..(39) 702 <223> OTHER INFORMATION: The 'Xaa' indicators at positions 33-39 indicate the absence οf 703 amino acid residues. 706 <220> FEATURE: 707 <221> NAME/KEY: misc_feature 708 <222> LOCATION: (49) 709 <223> OTHER INFORMATION: The 'Xaa' indicator at position 49 indicates the absence of an amino 710 acid residue. 712 <220> FEATURE: 713 <221> NAME/KEY: misc_feature 714 <222> LOCATION: (52)..(77)

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715 <223> OTHER INFORMATION: The 'Xaa' indicators at positions 52-77 indicate the absence of

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amino acid residues. 716 718 <220> FEATURE: 719 <221> NAME/KEY: misc_feature 720 <222> LOCATION: (89)..(90) 721 <223> OTHER INFORMATION: The 'Xaa' indicators at positions 89-90 indicate the absence of. amino acid residues. 722 724 <220> FEATURE: 725 <221> NAME/KEY: misc_feature 726 <222> LOCATION: (101) 727 <223> OTHER INFORMATION: The 'Xaa' indicator at position 101 indicates the absence of an amino acid residue. 728 730 <220> FEATURE: 731 <221> NAME/KEY: misc_feature 732 <222> LOCATION: (103) 733 <223> OTHER INFORMATION: The 'Xaa' indicator at position 103 indicates the absence of an 734 amino acid residue. 736 <220> FEATURE: 737 <221> NAME/KEY: misc_feature 738 <222> LOCATION: (118)..(129) 739 <223> OTHER INFORMATION: The 'Xaa' indicators at positions 118-129 indicate the absence of 740 amino acid residues. 742 <220> FEATURE: 743 <221> NAME/KEY: misc_feature 744 <222> LOCATION: (136) 745 <223> OTHER INFORMATION: The 'Xaa' indicator at position 136 indicates the absence of an 746 amino acid residue. 748 <220> FEATURE: 749 <221> NAME/KEY: misc_feature 750 <222> LOCATION: (140) 751 <223> OTHER INFORMATION: The 'Xaa' indicator at position 140 indicates the absence of an same eun 752 amino acid residue. 754 <400> SEQUENCE: 11 W--> 755 Xaa Phe Lys Ile Glu Thr Xaa Thr Pro Glu Ser Arg Xaa Tyr Leu Ala E--> 756 Gln Ile 5 E--> 757 1 E--> 758 10 15 W--> 760 Gly Val Ser Leu Thr Cys Ser Thr Thr Gly Cys Glu Xaa Xaa Asp Ser E--> 761 Xaa E--> 762 20 E--> 763 25 30 35 GlnW--> 765 Xaa Trp Thr Xaa Ile Asp Xaa Xaa Xaa Ser Pro Phe Phe Ser Arg E--> 766 Xaa Xaa E--> 767 40 45 E--> 768 50 W--> 770 Xaa Xaa

60

Xaa

E--> 771 Xaa

E--> 772

san

E--> 773 65 70
W--> 775 Xaa Xaa Xaa Xaa Xaa Ser Pro Leu Asn Gly Lys Val Thr Asn Glu Gly

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```
E--> 776 Xaa Xaa
                                                                                    75
E--> 777
                                              90
E--> 778 80
                         85
                                     Met Asn Pro Val Xaa
                                                               Ser Xaa Phe
W--> 780 Thr
                       Thr Leu
                                 Thr
                                                                               Glv
E--> 781 Glu
                                                                            95
E--> 782
E--> 783 100
                          105
              Tyr Leu Cys Thr Ala Thr Cys Glu Xaa Xaa Xaa Xaa
W--> 785 Ser
                                                                         Xaa
                                                                              Xaa Xaa
E--> 786 Xaa
             Xaa
                                                                                 110
E--> 787
                                                   125
E--> 788 115
                          120
                  Xaa Ser Arg Lys Leu Glu Lys Xaa Gly Ile Gln Xaa Val Glu
W--> 790 Xaa Xaa
E--> 791 Ile Tyr
                       same enon is seq. 12
                                                                                    135
E--> 792
E--> 793 140
     900 <210> SEO ID NO: 13
     901 <211> LENGTH: 144
     902 <212> TYPE: PRT
     903 <213> ORGANISM: 1F97 - Soluble Part of the Junction Adhesion Molecule from a Mouse
     905 <220> FEATURE:
     906 <221> NAME/KEY: misc_feature
     907 <222> LOCATION: (7)
     908 <223> OTHER INFORMATION: The 'Xaa' indicator at position 7 indicates the absence of
an amino
     909
               acid residue.
     911 <220> FEATURE:
     912 <221> NAME/KEY: misc_feature
     913 <222> LOCATION: (11)
     914 <223> OTHER INFORMATION: The 'Xaa' indicator at position 11 indicates the absence of
an amino
     915
              acid residue.
     917 <220> FEATURE:
     918 <221> NAME/KEY: misc_feature
     919 <222> LOCATION: (13)
     920 <223> OTHER INFORMATION: The 'Xaa' indicator at position 13 indicates the absence of
an amino
     921
              acid residue.
     923 <220> FEATURE:
     924 <221> NAME/KEY: misc_feature
     925 <222> LOCATION: (33)..(39)
     926 <223> OTHER INFORMATION: The 'Xaa' indicators at positions 33-39 indicate the absence
of
     927
              amino acid residues.
     929 <220> FEATURE:
     930 <221> NAME/KEY: misc_feature
     931 <222> LOCATION: (49)
     932 <223> OTHER INFORMATION: The 'Xaa' indicator at position 49 indicates the absence of
an amino
              acid residue
     935 <220> FEATURE:
     936 <221> NAME/KEY: misc_feature
     937 <222> LOCATION: (51)
     938 <223> OTHER INFORMATION: The 'Xaa' indicator at position 51 indicates the absence of
```

an amino 939

acid residue.

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```
941 <220> FEATURE:
     942 <221> NAME/KEY: misc_feature
     943 <222> LOCATION: (54)..(55)
     944 <223> OTHER INFORMATION: The 'Xaa' indicators at positions 54-55 indicate the absence
of
     945
               amino acid residues
     947 <220> FEATURE:
     948 <221> NAME/KEY: misc_feature
     949 <222> LOCATION: (65)..(72)
     950 <223> OTHER INFORMATION: The 'Xaa' indicators at positions 65-72 indicate the absence
of
     951
               amino acid residues.
     953 <220> FEATURE:
     954 <221> NAME/KEY: misc_feature
     955 <222> LOCATION: (87)..(92)
     956 <223> OTHER INFORMATION: The 'Xaa' indicators at positions 87-92 indicate the absence
of
     957
               amino acid residues.
     959 <220> FEATURE:
     960 <221> NAME/KEY: misc_feature
     961 <222> LOCATION: (101)
     962 <223> OTHER INFORMATION: The 'Xaa' indicator at position 101 indicates the absence of
an
     966 <221> NAME/KEY: misc_feature prof yrar
967 <222> LOCATION: (103)
     963
               amino acid residue
     968 <223> OTHER INFORMATION: The Waa indicator at position 103 indicates the absence of
an
     969
               amino acid residue.
     971 <220> FEATURE:
     972 <221> NAME/KEY: misc_feature
     973 <222> LOCATION: (121)..(131)
     974 <223> OTHER INFORMATION: The 'Xaa' indicators at positions 121-131 indicate the
absence of
     975
               amino acid residues.
     977 <220> FEATURE:
     978 <221> NAME/KEY: misc_feature
     979 <222> LOCATION: (140)
     980 <223> OTHER INFORMATION: The 'Xaa' indicator at position 140 indicates the absence of
an
                                                sand evine
     981
               amino acid residue.
     983 <400> SEQUENCE: 13
                  Ser Val Tyr Thr Xaa Ala Gln Ser Xaa Asp Xaa Val Gln Val
W--> 984 Lys Gly
E--> 985 Pro
             Glu
E--> 986
                                                                              5
                                                            1
E--> 987 10
                           15
W--> 989 Asn
             Glu
                   Ser
                        Ile Lys
                                  Leu
                                       Thr
                                             Cys
                                                  Thr
                                                       Tyr
                                                            Ser
                                                                 Gly Phe
                                                                           Ser
E--> 990 Xaa
             Xaa
E--> 991
                                                                                20
E--> 992 25
                         30
                                            35
                            Pro Arg
W--> 993 Xaa
             Xaa
                   Xaa
                        Ser
                                       Val Glu Trp
                                                     Lys
                                                           Phe Val Xaa
                                                                           Gln Xaa Gly
```

Xaa

E--> 994 Ser

45

40

Marie

E--> 995

E--> 996 50 W--> 998 Xaa Thr Thr Ala Leu Val Cys Tyr Asn Ser Xaa Xaa Xaa Xaa Xaa Xaa

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Input Set : A:\EP.txt Output Set: N:\CRF3\04112002\J016516.raw E--> 999 Xaa E--> 1000 E--> 1001 60 65 70 Pro Tyr Ala Asp Arg Val Thr Phe W--> 1003 Gln Ile Thr Ala Ser Ser Xaa E--> 1004 Xaa Xaa E--> 1005 75 E--> 1006 80 85 90 Ser W--> 1008 Xaa Gly Ile Thr Phe Ser Ser Val Xaa Thr Xaa Arg Lys Xaa E--> 1009 Asn Gly 95 E--> 1010 E--> 1011 100 105 Cys Met Val Ser Asx Glu Gly Gly Gln Xaa W--> 1013 Glu Tyr Thr Xaa Xaa Xaa E--> 1014 Xaa Xaa 110 E--> 1015 E--> 1016 115 120 125 Xaa Xaa Xaa Asn Tyr Gly Glu Val Ser Ile His W--> 1018 Xaa Xaa E--> 1019 Val Leu same error in Segr. 14-15 130 E--> 1020 135 E--> 1021 140 1230 <210> SEQ ID NO: 16 1231 <211> LENGTH: 144 1232 <212> TYPE: PRT 1233 <213> ORGANISM: 1IAR - Human Interleukin-4 Receptor Alpha Chain Complex 1235 <220> FEATURE: 1236 <221> NAME/KEY: misc_feature 1237 <222> LOCATION: (7) 1238 <223> OTHER INFORMATION: The 'Xaa' indicator at position 7 indicates the absence of an amino 1239 acid residue. 1241 <220> FEATURE: 1242 <221> NAME/KEY: misc_feature 1243 <222> LOCATION: (12)..(16) 1244 <223> OTHER INFORMATION: The 'Xaa' indicators at positions 12-16 indicate the absence of amino acid residues. 1245 1247 <220> FEATURE: 1248 <221> NAME/KEY: misc_feature 1249 <222> LOCATION: (49) 1250 <223> OTHER INFORMATION: The 'Xaa' indicator at position 49 indicates the absence of an amino 1251 acid residue. 1253 <220> FEATURE: 1254 <221> NAME/KEY: misc_feature 1255 <222> LOCATION: (54)..(55) 1256 <223> OTHER INFORMATION: The 'Xaa' indicators at positions 54-55 indicate the absence of 1257 amino acid residues. 1259 <220> FEATURE: 1260 <221> NAME/KEY: misc_feature 1261 <222> LOCATION: (65)..(90) 1262 <223> OTHER INFORMATION: The 'Xaa' indicators at positions 65-90 indicate the absence of 1263 amino acid residues.

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1265 <220> FEATURE:

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1266 <221> NAME/KEY: misc_feature 1267 <222> LOCATION: (101) 1268 <223> OTHER INFORMATION: The 'Xaa' indicator at position 101 indicates the absence of an amino acid residue. 1269 1271 <220> FEATURE: 1272 <221> NAME/KEY: misc_feature 1273 <222> LOCATION: (122)..(128) 1274 <223> OTHER INFORMATION: The 'Xaa' indicators at positions 122-128 indicate the absence of amino acid residues. 1275 1277 <220> FEATURE: 1278 <221> NAME/KEY: misc_feature 1279 <222> LOCATION: (141) 1280 <223> OTHER INFORMATION: The 'Xaa' indicator at position 141 indicates the absence of an sane evor 1281 amino acid residue. 1285 <400> SEQUENCE: 16 W--> 1286 Arg Ala Pro Gly Asn Leu Xaa Thr Val Asn Thr Xaa Xaa Xaa Xaa E--> 1287 Asn Val E--> 1288 E--> 1289 10 15 Thr Leu Leu Thr Trp Ser Asn Pro Tyr Pro Pro Asp Asn 1291 Ser Asp E--> 1292 Tyr Leu E--> 1293 20 E--> 1294 25 30 35 W--> 1296 Tyr Asn His Leu Thr Tyr Ala Val Asn Ile Ser Glu Xaa Asn Asp E--> 1297 Ala Xaa E--> 1298 40 E--> 1299 45 .50 Glu Arg Ile Tyr Asn Val Thr Tyr Xaa Xaa Xaa Xaa Xaa W--> 1301 Xaa Asp E--> 1302 Xaa E--> 1303 55 60 E--> 1304 65 70 W--> 1306 Xaa Xaa Xaa Xaa E--> 1307 Xaa Xaa E--> 1308 75 E--> 1309 80 85 90 W--> 1311 Leu Glu Pro Ser Leu Arg Ile Ala Ala Ser Xaa Thr Leu Lys E--> 1312 Ile E--> 1313 95 E--> 1314 100 105 W--> 1316 Tyr Ala Arg Val Arg Ala Trp Ala Gln Ala Tyr Asn Xaa Xaa Arg E--> 1317 Xaa Xaa E--> 1318 110 E--> 1319 115 120 125 W--> 1321 Xaa Thr Thr Trp Ser Glu Trp Ser Pro Ser Thr Lys Trp Xaa Xaa E--> 1322 Asn Ser E--> 1323 1324 135 1444 <210> SEQ ID NO: (18) 1445 <211> LENGTH: 363 last sequere in file E--> 1324 135

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```
1446 <212> TYPE: DNA
C--> 1447 <213> ORGANISM: Artificial
     1449 <220> FEATURE:
     1450 <221> NAME/KEY: misc_feature
     1451 <223> OTHER INFORMATION: Artificial Sequence: Exemplary primary scaffold used to
obtain
     1452
                optimal secondary
     1453
                scaffolds.
     1455 <220> FEATURE:
     1456 <221> NAME/KEY: misc_feature
     1457 <222> LOCATION: (73)..(99)
     1458 <223> OTHER INFORMATION: The nucleotide at positions 73-99 may be any nucleotide.
     1460 <220> FEATURE:
     1461 <221> NAME/KEY: misc_feature
     1462 <222> LOCATION: (157)..(177)
     1463 <223> OTHER INFORMATION: The nucleotide at positions 157-177 may be any nucleotide.
     1465 <220> FEATURE:
     1466 <221> NAME/KEY: misc_feature
     1467 <222> LOCATION: (292)..(333)
     1468 <223> OTHER INFORMATION: The nucleotide at positions 292-333 may be any nucleotide
     1470 <400> SEQUENCE: 18
E--> 1472 aat
                gtg
                      aaa
                            ctg
                                  gtt
                                        gaa
                                              aaa
                                                    ggt
                                                          ggc
                                                                aat
                                                                       ttc
                                                                             gtc
                                                                                   gaa
     1473 aac
                      gac
                            gat
                                  ctt
                                                 54
                gat
               Val Lys Leu Val Glu Lys Gly Gly Asn Phe Val Glu Asn Asp Asp
     1475 Asn
W--> 1476 Asp
               Leu
                                                                                     5
W--> 1477
                                                                 1
E--> 1478 10
                             15
                                                                                       nnn
E--> 1480 aag
              ctc acg
                          tgc
                                cgt
                                      gct
                                            nnn
                                                  nnn
                                                        nnn
                                                              nnn
                                                                     nnn
                                                                           nnn
                                                                                 nnn
                           tgg 108
W--> 1481 nnn
                atg
                      ggt
W--> 1483 Lys
               Leu Thr Cys Arg Ala Xaa
                                             Xaa
                                                  Xaa
                                                       Xaa
                                                            Xaa
                                                                 Xaa
                                                                      Xaa
                                                                           Xaa
                                                                                 Xaa
                                                                                     Met
W--> 1484 Gly
               Trp
                                                                                         20
W--> 1485
E--> 1486 25
                                 30
                                                            35
E--> 1488 ttc
                cgt
                      cag
                            gcg
                                  ccq
                                        aac
                                              gac
                                                    gac
                                                          agt
                                                                act
                                                                       aac
                                                                             gtg
W--> 1489 acc
                atc
                      gac
                            nnn
                                  nnn
                                         162
     1491 Phe
               Arg Gln Ala Pro Asn
                                        Asp
                                             Asp Ser Thr Asn Val
                                                                      Ala
                                                                           Thr
                                                                                Ile Asp
W--> 1492 Xaa
               Xaa
W--> 1493
                                                                 40
                                                                                      45
E--> 1494 50
E--> 1496 nnn
                nnn
                      nnn
                            nnn
                                  nnn
                                        tac
                                              ggt
                                                    gac
                                                          tcc
                                                                gtc
                                                                       aaa
                                                                             gag
                                                                                   cgc
     1497 ttc
                gat
                      atc
                            cgt
                                  cgc
                                         216
W--> 1499 Xaa
               Xaa Xaa Xaa Tyr
                                        Gly Asp Ser Val Lys Glu
                                                                      Arq
                                                                            Phe
                                                                                 Asp
W--> 1500 Arg
               Arg
W--> 1501
                                                                       55
E--> 1502 60
                                65
                                                 70
E--> 1504 gac
                                              gtt
                                                          tta
                                                                tcg
                                                                             gac
                                                                                   gat
                            tcc
                                                    acc
                                                                      atg
                aaa
                      ggc
                                  aac
                                        acc
     1505 ctg
                                           270
                caa
                      ccq
                            gaa
                                  qac
     1507 Asp
               Lys Gly Ser Asn Thr
                                       Val Thr Leu Ser Met Asp
                                                                      Asp
                                                                           Leu
W--> 1508 Glu
               Asp
                                same enou
                                                                                      75
W--> 1509
```

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E>	1510	80	85						90								
E>	1512	tct	gca	ga	a t	ac	aat	tgt	gca	nn	n i	nnn	nnn	nnn	nnn	nnn	
M>	1513	nnn	nnn	nnn	nnn	nnn	324										
M>	1515	Ser	Ala	Glu	${ t Tyr}$	Asn	Cys	Ala	Xaa								
M>	1516	Xaa	Xaa														
W>	1517							-							95		
E>	1518	100				105	5										
E>	1521	nnn	nnn	nn	n g	gt	cag	ggt	acc	ga	c q	gtt	acc	gtc	tcg	tc	g '
	1522	363															
W>	1524	Xaa	Xaa	Xaa	Gly	${ t Gln}$	Gly	Thr	Asp	Val	Thr	Val	Ser	Ser			
W>	1525										;	110			115		
E>	1526	120															



Use of n and/or Xaa has been detected in the Sequence Listing. Review the Sequence Listing to insure a corresponding explanation is presented in the <220> to <223> fields of each sequence using n or Xaa.



DATE: 04/11/2002

TIME: 13:20:27

VERIFICATION SUMMARY

PATENT APPLICATION: US/10/016,516

Input Set : A:\EP.txt

Output Set: N:\CRF3\04112002\J016516.raw

L:43 M:254 E: No. of Bases conflict, LENGTH:Input:0 Counted:39 SEQ:1 L:48 M:336 W: Invalid Amino Acid Number in Coding Region, SEQ ID:1 L:49 M:336 W: Invalid Amino Acid Number in Coding Region, SEQ ID:1 M:254 Repeated in SeqNo=1 L:52 M:341 W: (46) "n" or "Xaa" used, for SEQ ID#:1 L:55 M:341 W: (46) "n" or "Xaa" used, for SEQ ID#:1 L:56 M:336 W: Invalid Amino Acid Number in Coding Region, SEQ ID:1 L:57 M:336 W: Invalid Amino Acid Number in Coding Region, SEQ ID:1 L:61 M:341 W: (46) "n" or "Xaa" used, for SEQ ID#:1 L:64 M:336 W: Invalid Amino Acid Number in Coding Region, SEQ ID:1 L:64 M:341 W: (46) "n" or "Xaa" used, for SEQ ID#:1 L:65 M:336 W: Invalid Amino Acid Number in Coding Region, SEQ ID:1 L:69 M:341 W: (46) "n" or "Xaa" used, for SEQ ID#:1 L:72 M:336 W: Invalid Amino Acid Number in Coding Region, SEQ ID:1 L:72 M:341 W: (46) "n" or "Xaa" used, for SEQ ID#:1 L:73 M:336 W: Invalid Amino Acid Number in Coding Region, SEQ ID:1 L:76 M:341 W: (46) "n" or "Xaa" used, for SEQ ID#:1 L:79 M:341 W: (46) "n" or "Xaa" used, for SEQ ID#:1 L:80 M:336 W: Invalid Amino Acid Number in Coding Region, SEQ ID:1 L:81 M:336 W: Invalid Amino Acid Number in Coding Region, SEQ ID:1 L:89 M:336 W: Invalid Amino Acid Number in Coding Region, SEQ ID:1 L:102 M:254 E: No. of Bases conflict, LENGTH:Input:0 Counted:39 SEQ:2 L:106 M:336 W: Invalid Amino Acid Number in Coding Region, SEQ ID:2 L:120 M:254 E: No. of Bases conflict, LENGTH:Input:0 Counted:39 SEQ:3 L:124 M:336 W: Invalid Amino Acid Number in Coding Region, SEQ ID:3 L:125 M:336 W: Invalid Amino Acid Number in Coding Region, SEQ ID:3 M:254 Repeated in SeqNo=3 L:132 M:336 W: Invalid Amino Acid Number in Coding Region, SEQ ID:3 L:133 M:336 W: Invalid Amino Acid Number in Coding Region, SEQ ID:3 L:140 M:336 W: Invalid Amino Acid Number in Coding Region, SEQ ID:3 L:141 M:336 W: Invalid Amino Acid Number in Coding Region, SEQ ID:3 L:148 M:336 W: Invalid Amino Acid Number in Coding Region, SEQ ID:3 L:149 M:336 W: Invalid Amino Acid Number in Coding Region, SEQ ID:3 L:156 M:336 W: Invalid Amino Acid Number in Coding Region, SEQ ID:3 L:157 M:336 W: Invalid Amino Acid Number in Coding Region, SEQ ID:3 L:164 M:336 W: Invalid Amino Acid Number in Coding Region, SEQ ID:3 L:165 M:336 W: Invalid Amino Acid Number in Coding Region, SEQ ID:3 L:172 M:336 W: Invalid Amino Acid Number in Coding Region, SEQ ID:3 L:173 M:336 W: Invalid Amino Acid Number in Coding Region, SEQ ID:3 L:181 M:336 W: Invalid Amino Acid Number in Coding Region, SEQ ID:3 L:193 M:254 E: No. of Bases conflict, LENGTH:Input:0 Counted:39 SEQ:4 L:197 M:336 W: Invalid Amino Acid Number in Coding Region, SEQ ID:4 L:198 M:336 W: Invalid Amino Acid Number in Coding Region, SEQ ID:4 M:254 Repeated in SeqNo=4 L:205 M:336 W: Invalid Amino Acid Number in Coding Region, SEQ ID:4 L:206 M:336 W: Invalid Amino Acid Number in Coding Region, SEQ ID:4 L:213 M:336 W: Invalid Amino Acid Number in Coding Region, SEQ ID:4 L:214 M:336 W: Invalid Amino Acid Number in Coding Region, SEQ ID:4

VERIFICATION SUMMARYPATENT APPLICATION: **US/10/016,516**DATE: 04/11/2002 TIME: 13:20:27

Input Set : A:\EP.txt

Output Set: N:\CRF3\04112002\J016516.raw

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L:221 M:336 W: Invalid Amino Acid Number in Coding Region, SEQ ID:4
L:222 M:336 W: Invalid Amino Acid Number in Coding Region, SEQ ID:4
L:229 M:336 W: Invalid Amino Acid Number in Coding Region, SEQ ID:4
L:230 M:336 W: Invalid Amino Acid Number in Coding Region, SEQ ID:4
L:237 M:336 W: Invalid Amino Acid Number in Coding Region, SEQ ID:4
L:238 M:336 W: Invalid Amino Acid Number in Coding Region, SEQ ID:4
L:245 M:336 W: Invalid Amino Acid Number in Coding Region, SEQ ID:4
L:246 M:252 E: No. of Seq. differs, <211>LENGTH:Input:422 Found:363 SEQ:4
L:258 M:254 E: No. of Bases conflict, LENGTH:Input:0 Counted:39 SEQ:5
L:262 M:336 W: Invalid Amino Acid Number in Coding Region, SEQ ID:5
L:263 M:336 W: Invalid Amino Acid Number in Coding Region, SEQ ID:5
M:254 Repeated in SeqNo=5
L:270 M:336 W: Invalid Amino Acid Number in Coding Region, SEQ ID:5
L:271 M:336 W: Invalid Amino Acid Number in Coding Region, SEQ ID:5
L:278 M:336 W: Invalid Amino Acid Number in Coding Region, SEQ ID:5
L:279 M:336 W: Invalid Amino Acid Number in Coding Region, SEQ ID:5
L:286 M:336 W: Invalid Amino Acid Number in Coding Region, SEQ ID:5
L:287 M:336 W: Invalid Amino Acid Number in Coding Region, SEQ ID:5
L:294 M:336 W: Invalid Amino Acid Number in Coding Region, SEQ ID:5
L:295 M:336 W: Invalid Amino Acid Number in Coding Region, SEQ ID:5
L:412 M:341 W: (46) "n" or "Xaa" used, for SEQ ID#:8
L:413 M:332 E: (32) Invalid/Missing Amino Acid Numbering, SEQ ID:8
M:332 Repeated in SeqNo=8
L:417 M:341 W: (46) "n" or "Xaa" used, for SEQ ID#:8
L:418 M:341 W: (46) "n" or "Xaa" used, for SEQ ID#:8
L:422 M:341 W: (46) "n" or "Xaa" used, for SEQ ID#:8
L:423 M:341 W: (46) "n" or "Xaa" used, for SEQ ID#:8
L:427 M:341 W: (46) "n" or "Xaa" used, for SEQ ID#:8
L:437 M:341 W: (46) "n" or "Xaa" used, for SEQ ID#:8
L:447 M:341 W: (46) "n" or "Xaa" used, for SEQ ID#:8
L:524 M:341 W: (46) "n" or "Xaa" used, for SEQ ID#:9
L:525 M:332 E: (32) Invalid/Missing Amino Acid Numbering, SEQ ID:9
M:332 Repeated in SeqNo=9
L:529 M:341 W: (46) "n" or "Xaa" used, for SEQ ID#:9
L:534 M:341 W: (46) "n" or "Xaa" used, for SEQ ID#:9
L:535 M:341 W: (46) "n" or "Xaa" used, for SEQ ID#:9
L:539 M:341 W: (46) "n" or "Xaa" used, for SEQ ID#:9
L:549 M:341 W: (46) "n" or "Xaa" used, for SEQ ID#:9
L:554 M:341 W: (46) "n" or "Xaa" used, for SEQ ID#:9
L:555 M:341 W: (46) "n" or "Xaa" used, for SEQ ID#:9
L:559 M:341 W: (46) "n" or "Xaa" used, for SEQ ID#:9
L:636 M:341 W: (46) "n" or "Xaa" used, for SEQ ID#:10
L:637 M:332 E: (32) Invalid/Missing Amino Acid Numbering, SEQ ID:10
M:332 Repeated in SeqNo=10
L:641 M:341 W: (46) "n" or "Xaa" used, for SEQ ID#:10
L:642 M:341 W: (46) "n" or "Xaa" used, for SEQ ID#:10
L:646 M:341 W: (46) "n" or "Xaa" used, for SEQ ID#:10
L:647 M:341 W: (46) "n" or "Xaa" used, for SEQ ID#:10
L:651 M:341 W: (46) "n" or "Xaa" used, for SEQ ID#:10
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